

Project Baseline Summary Report

Data Source: **EM CDB**

Operations/Field Office: **Richland**

Site Summary Level: **Hanford Site**

Project **RL-ER05 / Facility Surveillance & Maintenance - ADS 3500**

Report Number: **GEN-01b**

Print Date: **3/9/2000**

HQ ID: **0419**

General Project Information

Project Description Narratives

Purpose, Scope, and Technical Approach:

Purpose: This PBS provides for the management and integration of surveillance and maintenance of waste sites and facilities assigned to the ER Project. The waste sites and facilities are located throughout the Hanford Site.

Work scope within this PBS includes:

- * Managing and integrating the surveillance and maintenance of inactive facilities assigned to the ER Project.
- * Managing and integrating the Radiation Area Remedial Action activities.
- * Managing and integrating the transition to the ER Project of inactive facilities from other EM Projects at the Hanford Site.

Scope: The Hanford Site contains many surplus facilities remaining from past plutonium production activities that were required by the Department of Defense from World War II through the Cold War. These facilities are now aged and deteriorating. Because the facilities no longer have a production mission, they must be either maintained (to preserve their integrity) or removed to (1) preclude the escape of potentially hazardous substances to the accessible environment; or (2) reduce unacceptable industrial safety risks.

Surveillance and Maintenance (S&M) is divided into two key areas:

1. Inactive Facility Surveillance and Maintenance (IFS&M).
2. Radiation Area Remedial Action (RARA).

In addition, this project includes the transition activities involved in the ER's acceptance of new facilities from other DOE programs through the deactivation process.

The purpose of the S&M function for contaminated surplus facilities awaiting decommissioning is as follows:

- Ensure adequate containment of contamination.
- Provide physical safety and security controls.
- Maintain the facilities in a manner that will minimize potential hazards to the public and workers.
- Maintain systems/equipment that will be essential for D&D activities in a shutdown but standby/operational mode.
- Provide a mechanism for the identification and compliance with applicable environmental, safety, health, and safeguards/security requirements.

In parallel with S&M, the risk assessment/corrective maintenance program performs vital corrective maintenance actions in the surplus facilities. The purpose of the program is to establish and maintain the surplus facilities in a safe condition until the buildings are dismantled or released for other uses.

The S&M project is responsible for RARA on approximately 1000 inactive waste sites, including ten Resource Conservation and Recovery Act of

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1976 (RCRA) treatment, storage, and disposal (TSD) units. The inactive waste sites include unplanned release sites, cribs, trenches, ponds, and burial grounds. The waste sites are located in the 100, 200, 300, and 600 Areas of the Hanford Site.

Surveillance and Maintenance is required until the facilities are decommissioned and waste sites remediated.

Technical Approach: The S&M Project produces limited waste quantities.

Surveillance and Maintenance (S&M) of inactive facilities is required to identify and mitigate worker and environmental risks associated with surplus facilities. These facilities have far exceeded their design life and most have had limited maintenance. The facilities do not meet current codes and pose a variety of hazards to the workers. The primary emphasis of the S&M program is to identify the potential human health and safety hazards through periodic scheduled surveillances and addresses the risk through facility upgrades. In general, major repairs are identified through risk assessments for the major facilities. The facility systems utilized for S&M are also upgraded to reduce the frequency of S&M at the major facilities. New facilities entering the S&M program are coordinated with the Facility Transition program and will have established end point criteria that define the conditions of the facility as it enters the S&M project. The S&M program also includes the RARA program for the maintenance of contaminated soil sites by controlling vegetation growth at the waste sites, removing contaminated vegetation when it is found, and posting areas of surface/soil contamination. Remote monitoring technologies are being implemented to minimize the frequency of surveillance entries to hazardous facilities.

Project Status in FY 2006:

Through FY06 over 200 facilities will be under the S&M project. Maintenance and upgrade activities upgrades to the canyon facilities (i.e., REDOX, U Plant, PUREX, and B-Plant) will continue and result in a reduction to the frequency of S&M workers entering these facilities. The RARA program will continue to control the growth of deep-rooted vegetation on existing waste sites to minimize spread of contamination.

Post-2006 Project Scope:

S&M will continue as facilities are transitioned into the ER Project. Waste sites will continue to be maintained through the RARA project until they complete remediation that has been performed by the Remedial Action Project.

Project End State

The S&M Project will support the goals and end states for all areas of the Hanford Site. See other ER PBS's for specific end state information.

Cost Baseline Comments:

The cost estimates for the ER Project are developed through the use of MCACES and RACER models and activity based estimates for project activities like Surveillance and Maintenance, and program management and support.

The contingency for outyears was developed through the use of a "Monte Carlo" analysis and selection of an acceptable level of risk.

Safety & Health Hazards:

The Richland Environmental Restoration (ER) Project's primary responsibilities are the cleanup of past-practice waste sites, addressing the contaminated groundwater, and decontamination and decommissioning of surplus facilities. In 1987 the Hanford Site Federal Facility Agreement and Consent Order (TPA) was signed by EPA, Ecology, and DOE. This agreement is the primary driver for essentially all remediation and D&D activities.

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The Hanford Site can be grouped into four primary areas: 100, 200, 300, and the remainder of the Hanford Site. This PBS addresses ES&H and mission components associated with conduct of routine surveillance and maintenance (S&M) activities in all four primary areas of the Hanford Site.

During the years of special nuclear materials (SNM) production, numerous facilities were constructed, modified, and shut down in the 100, 200, and 300 Areas. In many cases, the deactivation activities and the facility surveillance and maintenance (S&M) were limited. As a result, when the mission of the Hanford Site changed from production to cleanup, the D&D Project was left with a group of facilities that were in poor physical condition, contained waste in numerous forms, and presented serious industrial hazards to the workers on the Hanford Site. ER Surveillance & Maintenance is responsible for the assessment and surveillance and maintenance of these facilities until they are actually undergoing D&D activities. Surplus facilities from facilities transition (i.e., EM-60) will transition into the S&M PBS and will eventually become part of the D&D Project. D&D work will be integrated with the Remedial Action Project to achieve greater cost-efficiencies.

The N Reactor and its ancillary facilities have been deactivated as part of the D&D Project under a separate PBS (ER06). However, in FY99, S&M of the N Reactor and its ancillary support facilities and structures has become part of this PBS. The remainder of the facilities are either operational, are undergoing shutdown procedures, or are currently being deactivated and will be transferred to the ER D&D Project sometime in the future. This PBS is responsible for the surveillance and maintenance of the surplus facilities currently assigned to ER, and surveillance and maintenance of waste sites under the Radiation Area Remedial Action (RARA) program. Responsibilities include: 1) managing and integrating the surveillance and maintenance of inactive facilities assigned to the ER project; 2) managing and integrating the Radiation Area Remedial Action activities; 3) managing and integrating the transition to the ER Project of inactive facilities from other EM projects at the Hanford Site.

Each subproject will conduct a hazard analysis evaluation or an operational readiness review, as necessary.

Safety & Health Work Performance:

The resources necessary to accomplish the work safely are provided through the Authorization Basis, the Site Health and Safety Program requirements, and through the resources allocated to the site's integrated safety management system in the following functional categories: radiological controls, emergency management, fire protection, industrial hygiene, industrial safety, occupation medical services, management and oversight, transportation safety, nuclear safety and management oversight.

ER resources are planned and allocated into these categories by functional responsibility through the work breakdown structure and resource loaded into the project for each fiscal year. Average hourly labor rates vary among projects based on the work scope and related skills mix.

The Emergency Preparedness functional task includes inspection of emergency facilities and equipment; emergency response team personnel training, drills and exercises relative to personnel contamination; construction accident response; maintaining/updating the current emergency plan based on site-specific hazards; coordination with state and local authorities and federal agencies; responses to worker injuries; and recordable occurrences and normal events.

The Fire Protection functional task includes related inspections and testing; flammable and explosive material control; review design

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plans/specifications for compliance with regulations, codes, and standards; and review and concurrence of work packages.

The Industrial Hygiene functional task includes the Chemical Management system, anticipation, recognition, evaluation and control of health hazards; redesign of equipment and tasks; review and approval of work packages; design of airborne fiber wetting systems; respiratory protection standards; respiratory protection equipment supplies; substitution of less hazardous materials; written and verbal communication of real and perceived hazards; personnel protection, and asbestos fiber counts and sample analysis.

The Industrial Safety functional area includes electrical safety; machinery and pressure system safety; hoisting; rigging, and material handling, lockout/tagout; confined space controls; platform, man-lift and scaffolding usage; safe surfaces for walking and working; hand and portable power tool safety; explosives and hazardous material handling, construction safety; review of work packages; site surveillances or subcontractor review.

The Management and Oversight functional task includes S&H documentation, action tracking; S&H self assessment activities; internal audits and surveillance; external S&H program reviews; operational readiness reviews; and Voluntary Protection Program (VPP); trend analysis; lessons learned; coordination and communication with DOE, state and local authorities.

The Management, Oversight, and Reporting functional task includes the coordination of project environmental protection plans, documentation and control, information management, compliance and corrective action tracking, appraisals and self assessments and general environmental monitoring and coordination.

The Occupational Medical Services functional task includes medical scheduling, labor and industries, and OSHA reporting; oversight of the Site Occupational Medical provider; hazardous worker or asbestos worker pre/post-job medical screening coordination, tracking; and case management.

The Nuclear Safety functional task includes providing direction for the implementation of DOE Orders and Standards related to nuclear safety. In addition, the functional group assists the projects in the development, implementation, and oversight of the safety analysis process.

The Radiation Protection functional task includes radiation monitoring equipment and procedures for radiation controls, oversight of personnel and facilities, radiation control monitoring, interlocks, instrumentation for shielding for radiation-generating devices; equipment and procedures used to minimize or mitigate external exposures; and personnel dosimetry, bioassay program, and radiation-exposure records.

The Transportation Safety functional task includes the activities required to ensure safe packaging and transportation of asbestos, radioactive and hazardous materials, and approval of D.O.T. shippers and container documentation. NOTE: The amount of funding made available for this PBS in any fiscal year will determine the work that will be performed, which will, in turn, be a basis for adjustment in the associated S&H requirements.

PBS Comments:

The focus of the Project S&M is the maintenance of current facilities in a condition that does not pose a risk to the public, workers or environment, support for facilities transitioning into the D&D project, and continued RARA of waste sites.

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Baseline Validation Narrative:

Baseline validation by Team Associates for DOE.

Validation Report - Recleaned Environmental Restoration Project FY 1996 Baseline Validation, May 1996.

The DOE requested an independent contractor, Team Associates, to perform a validation of the Richland Environmental Restoration Project. This validation was a follow up of the validation performed for the FY 1995 Baseline. Estimate models with near-term implementation schedules and total project summary costs were reviewed. The validation was broken down into three distinct efforts consistent with the validation objectives.

1) An in-depth review of MCACES models provided by DOE was performed

2) A review of near-term schedules for 100 BC and 300 FF areas to evaluate reasonableness and feasibility of achievement.

3) A top down assessment of the cost estimating process for consistency of approach to identify opportunities for improvement.

There is a formal validation of the

current baseline (developed in October 1998 and approved in January 1999) scheduled for March 1999.

General PBS Information

Project Validated? Yes **Date Validated:** 5/31/1996

Has Headquarters reviewed and approved project? Yes

Date Project was Added: 12/1/1997

Baseline Submission Date:

FEDPLAN Project? Yes

Drivers:	CERCLA	RCRA	DNFSB	AEA	UMTRCA	State	DOE Orders	Other
	Y	Y						

Project Identification Information

DOE Project Manager: P.M. Pak

DOE Project Manager Phone Number: 509-376-4798

DOE Project Manager Fax Number: 509-376-4360

DOE Project Manager e-mail address:

Is this a High Visibility Project (Y/N):

Planning Section

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Baseline Costs (in thousands of dollars)

	1997-2006 Total	2007-2070 Total	1997-2070 Total	1997	Actual 1997	1998	Actual 1998	1999	2000	2001	2002	2003	2004	2005	2006	
PBS Baseline (current year dollars)	131,594	578,628	710,222	10,013	10,279	12,039	10,564	13,845	12,552	12,808	13,621	13,833	14,005	14,332	14,546	
PBS Baseline (constant 1999 dollars)	121,636	311,277	432,913	10,013	10,279	12,039	10,564	13,845	12,222	12,143	12,562	12,410	12,211	12,167	12,024	
PBS EM Baseline (current year dollars)	131,594	578,628	710,222	10,013	10,279	12,039	10,564	13,845	12,552	12,808	13,621	13,833	14,005	14,332	14,546	
PBS EM Baseline (constant 1999 dollars)	121,636	311,277	432,913	10,013	10,279	12,039	10,564	13,845	12,222	12,143	12,562	12,410	12,211	12,167	12,024	
	2007	2008	2009	2010	2011- 2015	2016- 2020	2021- 2025	2026- 2030	2031- 2035	2036- 2040	2041- 2045	2046- 2050	2051- 2055	2056- 2060	2061- 2065	2066- 2070
PBS Baseline (current year dollars)	14,938	13,525	15,681	15,970	85,297	96,400	109,987	86,250	54,252	51,916	34,412	0				
PBS Baseline (constant 1999 dollars)	12,024	10,600	11,967	11,867	58,555	57,924	57,846	39,703	21,860	18,309	10,622	0				
PBS EM Baseline (current year dollars)	14,938	13,525	15,681	15,970	85,297	96,400	109,987	86,250	54,252	51,916	34,412	0				
PBS EM Baseline (constant 1999 dollars)	12,024	10,600	11,967	11,867	58,555	57,924	57,846	39,703	21,860	18,309	10,622	0				

Baseline Escalation Rates

1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009
0.00%	0.00%	0.00%	2.70%	2.70%	2.80%	2.80%	2.90%	2.70%	2.70%	2.70%	2.70%	2.70%

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2010	2011-2015	2016-2020	2021-2025	2026-2030	2031-2035	2036-2040	2041-2045	2046-2050	2051-2055	2056-2060	2061-2065	2066-2070
2.70%	2.70%	2.70%	2.70%	2.70%	2.70%	2.70%	2.70%	2.70%	2.70%			

Project Reconciliation

Project Completion Date Changes:

Previously Projected End Date of Project: 9/30/2043

Current Projected End Date of Project: 9/30/2043

Explanation of Project Completion Date Difference (if applicable):

Project Cost Estimates (in thousands of dollars)

Previously Estimated Lifecycle Cost (1997 - 2070, 1998 Dollars):	431,118	Actual 1997 Cost:	10,279	Actual 1998 Cost:	10,564
Previously Estimated Lifecycle Cost of Project (1999 - 2070, 1998 Dollars):	410,275	Inflation Adjustment (2.7% to convert 1998 to 1999 dollars):			11,077
Previously Estimated Lifecycle Cost (1999 - 2070, 1999 Dollars):	421,352				

Project Cost Changes

Cost Adjustments Reconciliation Narratives

Cost Change Due to Scope Deletions (-):

Cost Reductions Due to Efficiencies (-):

Cost Associated with New Scope (+):

Cost Growth Associated with Scope Previously Reported (+):

Cost Reductions Due to Science & Technology Efficiencies (-):

Subtotal: 421,352

Additional Amount to Reconcile (+): -10,491

Current Estimated Lifecycle Cost (1999 - 2070, 1999 Dollars): **410,861**

Milestones

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Milestone/Activity	Field Milestone Code	Original Date	Baseline Date	Legal Date	Forecast Date	Actual Date	EA	DNFSB	Mgmt. Commit.	Key Decision	Intersite
Begin Surveillance and Maintenance Project	PBS-07-030		2/28/1997								
PBS Mission Completion	PBS-MC-030		9/30/2043								
PBS Project End	PBS-PE-030		9/30/2043								

Milestones - Part II

Milestone/Activity	Field Milestone Code	Critical Decision	Critical Closure Path	Project Start	Project End	Mission Complete	Tech Risk	Work Scope Risk	Intersite Risk	Cancelled	Milestone Description
Begin Surveillance and Maintenance Project	PBS-07-030			Y							Administrative input to document the start of this PBS.
PBS Mission Completion	PBS-MC-030					Y					Administrative input to document the mission completion of this PBS.
PBS Project End	PBS-PE-030				Y						Administrative input to document the project end of this PBS.

Performance Measure Metrics

Category/Subcategory	Units	1997-2006 Total	2007-2070 Total	1997-2070 Total	Actual Pre-1997	Planned 1997	Actual 1997	Planned 1998	Planned 1999	Planned 2000	Planned 2001	Planned 2002	Planned 2003	Planned 2004
Tech.														
Deployed	Ntd	3.00	0.00	3.00					3.00					
Category/Subcategory	Units	Planned 2004	Planned 2005	Planned 2006	Planned 2007	Planned 2008	Planned 2009	Planned 2010	Planned 2011 - 2015	Planned 2016 - 2020	Planned 2021 - 2025	Planned 2026 - 2030	Planned 2031 - 2035	Planned 2036 - 2040
Tech.														
Deployed	Ntd													
Category/Subcategory	Units	Planned 2036 - 2040	Planned 2041 - 2045	Planned 2046 - 2050	Planned 2051 - 2055	Planned 2056 - 2060	Planned 2061 - 2035	Planned 2066 - 2070	Exceptions	Lifecycle Total				

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Category/Subcategory	Units	Planned 2036 - 2040	Planned 2041 - 2045	Planned 2046 - 2050	Planned 2051 - 2055	Planned 2056 - 2060	Planned 2061 - 2035	Planned 2066 - 2070	Exceptions	Lifecycle Total
Tech.										
Deployed	Ntd								6.00	6.00

Technology Needs

Site Need Code: RL-DD034

Site Need Name: Remote/Robotic Technologies for Access and Deployment of Characterization and Sampling Tools for CDI.

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD035

Site Need Name: Visual/Spatial Imaging of the 221-U Facility and Equipment for CDI.

Focus Area Work Package ID: DD-03

Focus Area Work Package: Canyon Disposition Initiative

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

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Technology Needs

Site Need Code: RL-DD036

Site Need Name: General Radiation Surveys of Concrete and Equipment in the Materials Processing Facilities for CDI.

Focus Area Work Package ID: DD-03

Focus Area Work Package: Canyon Disposition Initiative

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD037

Site Need Name: Detection of Freestanding Liquid in Equipment (e.g., tanks) and Piping for CDI.

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

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Technology Needs

Site Need Code: RL-DD038

Site Need Name: Characterization of Liquids in Equipment (e.g., tanks) and Pipes for CDI.

Focus Area Work Package ID: DD-05

Focus Area Work Package: Material Recycle and Release

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD039

Site Need Name: Characterization of Solids (Sediments/Sludge/Dust) on Floors and Walls, and in Equipment in the Materials Processing Facilities for CDI.

Focus Area Work Package ID: DD-03

Focus Area Work Package: Canyon Disposition Initiative

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

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Technology Needs

Site Need Code: RL-DD040

Site Need Name: Characterization of Concrete Floors and Walls in the Materials Processing Facilities for CDI.

Focus Area Work Package ID: DD-05

Focus Area Work Package: Material Recycle and Release

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD022-S

Site Need Name: Photon Assisted Decontamination Chemistry

Focus Area Work Package ID:

Focus Area Work Package:

Focus Area:

Agree with Technology Link: N

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

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Technology Needs

Site Need Code: RL-DD026-S

Site Need Name: Contaminant Binding Science Need

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD033-S

Site Need Name: Reaction of Neutrons with Detectors for Building 324

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Cost

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Technology Needs

Site Need Code: RL-DD048

Site Need Name: Volume Reduction of Equipment for CDI

Focus Area Work Package ID: DD-03

Focus Area Work Package: Canyon Disposition Initiative

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD049

Site Need Name: Waste Encapsulation and Stabilization for CDI

Focus Area Work Package ID: DD-03

Focus Area Work Package: Canyon Disposition Initiative

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

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Technology Needs

Site Need Code: RL-DD050

Site Need Name: Sealant Technologies for CDI

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD051

Site Need Name: High Profile Surface Barrier for CDI

Focus Area Work Package ID: SS-04

Focus Area Work Package: Long-Lived Caps

Focus Area: SCFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

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Report Number: **GEN-01b**

Print Date: **3/9/2000**

HQ ID: **0419**

Technology Needs

Site Need Code: RL-DD053

Site Need Name: Computerized modeling for facility planning, operation, and waste loading and tracking for the Canyon Disposition Initiative (CDI) Project

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD054

Site Need Name: CDI - Electronic job control system for the Surveillance and Maintenance Program

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Cost

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD055

Site Need Name: CDI - Remote monitoring system upgrades for the Surveillance and Maintenance Program

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Dataset Name: **FY 1999 Planning Data**

Date of Dataset: **9/20/1999**

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Project Baseline Summary Report

Data Source: **EM CDB**

Operations/Field Office: **Richland**

Site Summary Level: **Hanford Site**

Project **RL-ER05 / Facility Surveillance & Maintenance - ADS 3500**

Report Number: **GEN-01b**

Print Date: **3/9/2000**

HQ ID: **0419**

Technology Needs

Site Need Code: RL-DD056

Site Need Name: Facility structural life model for optimizing maintenance and time to decommission for the Surveillance and Maintenance Program

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD057

Site Need Name: Replacement roof of long-lived construction for the PUREX facility

Focus Area Work Package ID: DD-08

Focus Area Work Package: Separation Process Facilities D&D

Focus Area: DDFA

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Site Need Code: RL-DD058

Site Need Name: Long-acting method to control the growth of deep-rooted plants in areas of contaminated soil maintained by the Surveillance and Maintenance Program

Focus Area Work Package ID:

Focus Area Work Package:

Focus Area:

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Both

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Dataset Name: **FY 1999 Planning Data**

Date of Dataset: **9/20/1999**

Project Baseline Summary Report

Data Source: **EM CDB**

Operations/Field Office: **Richland**

Site Summary Level: **Hanford Site**

Project **RL-ER05 / Facility Surveillance & Maintenance - ADS 3500**

Report Number: **GEN-01b**

Print Date: **3/9/2000**

HQ ID: **0419**

Technology Needs

Site Need Code: RL-DD059

Site Need Name: Decontamination of surface contaminated lead for the Surveillance and Maintenance Program.

Focus Area Work Package ID:

Focus Area Work Package:

Focus Area:

Agree with Technology Link: Y

Benefits (Cost, Risk Reduction, Both): Cost

Technologies

Cost Savings (in thousands of dollars)

Range of Estimate

Technology Deployments

<u>Deployment Status</u>	<u>Deployment Year</u>		
	<u>Planned</u>	<u>Forecast</u>	<u>Actual Date</u>
Technology Name: Gamma Cam (TM) Radiation Imaging System			
Deployment Commitment	1999		
Technology Name: In Situ Object Counting System			
Potential Deployment			
Technology Name: CDI Remote Characterization System			
Deployment Commitment	1999		
Technology Name: D&D Sensors for the Canyon Disposition Initiative			
Potential Deployment			

Dataset Name: **FY 1999 Planning Data**

Date of Dataset: **9/20/1999**

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Project Baseline Summary Report

Data Source: **EM CDB**

Operations/Field Office: **Richland**

Site Summary Level: **Hanford Site**

Project **RL-ER05 / Facility Surveillance & Maintenance - ADS 3500**

Report Number: **GEN-01b**

Print Date: **3/9/2000**

HQ ID: **0419**

Technology Deployments

		Deployment Year		
<u>Deployment Status</u>		<u>Planned</u>	<u>Forecast</u>	<u>Actual Date</u>
Technology Name:	Detection of Free Standing Liquids			
Deployment Commitment		1999		
Technology Name:	Technology for TRU Screening			
Potential Deployment				